DEPARTMENT OF TRANSPORTATION DIVISION OF ENVIRONMENTAL ANALYSIS, MS 27 1120 N STREET P. O. BOX 942874 SACRAMENTO, CA 94274-0001 PHONE (916) 653-7507 FAX (916) 653-7757 TTY (916) 653-4086

4/3/07 BdMtg Item 4 Clear Lake Deadline: 3/19/07 noon

Flex your power!
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March 19, 2007

Ms. Song Her
Clerk to the Board
State Water Resources Control Board
1001 I Street
Sacramento, CA 95814
E-mail: commentletters@waterboards.ca.gov
Fax: (916) 341-5620

RE: Comment Letter - Clear Lake Nutrient TMDL

Dear Ms. Her:

The California Department of Transportation (Department) has reviewed the proposed Basin Plan Amendment to the Water Quality Control Plan for the control of nutrients in Clear Lake. The Department strongly supports efforts to protect the environment and to achieve the best-possible water quality and offers the following comments:

- Monitoring Responsibility and Funding: The Total Maximum Daily Load (TMDL), as currently written, does not clearly specify who will conduct the monitoring or how it will be funded. In response to comments submitted June 6, 2006, the Regional Water Quality Control Board, Central Valley Region refers to responsible parties. Please clarify who the responsible parties are.
- Appropriateness of the Chlorophyll-a Target: Chlorophyll-a may not be the appropriate indicator of the lake's health. Monitoring conducted by the Department of Water Resources supported the TMDL model. It shows that, in recent years, chlorophyll-a levels remained high, even though the lake clarity significantly improved. The correlation between phosphorus reduction and chlorophyll-a levels in the lake is not well understood and has not been clearly established.
- Internal vs. External Loading: The clarity of the lake largely depends on existing phosphorus in the lake bottom and washout over time. The relative importance of internal vs. external loading should be studied further. Residence time of phosphorus in the lake should be evaluated to better estimate how using external load reduction



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could potentially reduce the amount of algal blooms in the lake. Furthermore, the implementation plan should clearly specify how allocation requirements would change as clarity of the lake improves.

• Caltrans Load Allocation: Allocations to point source dischargers are loosely based on relative land area rather than potential sediment contribution to the lake and current efforts to control sediments. Our estimates of the potential phosphorus loading from Department roadway varies from 289 kg to 1038 kg per year. These estimates assume that all runoff enters the lake directly and are likely overly conservative. However, these estimates provide some insight into the level of reduction (65%–90%) that the Department would have to obtain to meet the Department's waste load allocation of 100 kg per year. Such reductions are technically and economically infeasible and would have a significant impact on roadway operations and maintenance. Regional efforts to control sediments and phosphorus loading may be more cost effective than implementing individual BMPs. With the increased development in the region, opportunities for coordination will increase.

We appreciate this opportunity to comment on the proposed Basin Plan Amendments. If you have any questions, please contact Keith Jones at (916) 653-4947.

Sincerely,

G. SCOTT/MCGOWEN
Chief Environmental Engineer